

## Product datasheet for **RC227081**

### MTRES1 (NM\_001142468) Human Tagged ORF Clone

#### Product data:

|                           |                           |
|---------------------------|---------------------------|
| Product Type:             | Expression Plasmids       |
| Tag:                      | Myc-DDK                   |
| Symbol:                   | MTRES1                    |
| Synonyms:                 | C6orf203; HSPC230; PRED31 |
| Mammalian Cell Selection: | Neomycin                  |
| Vector:                   | pCMV6-Entry (PS100001)    |
| E. coli Selection:        | Kanamycin (25 ug/mL)      |

**ORF Nucleotide Sequence:** >RC227081 ORF sequence  
Red=Cloning site Blue=ORF Green=Tags(s)

TTTTGTAATACGACTCACTATAGGGCGGCCGGAATTCGTCGACTGGATCCGGTACCGAGGAGATCTGCC  
GCC**GCGATCGCC**

ATGGCTATGGCTAGTGTTAAATTGCTTGCCGGTGTTTTAAGAAAGCCAGATGCCTGGATTGGACTCTGGG  
GTGTTCTCCGAGGGACACCTTCATCATACAACTCTGTAATTCCTGGAATCGATACTGTATTTTCTAG  
TACCAAGTTACGTGCACCAATTATAAACTCTTTTATAATATTTCTCACTGAGACTCCCAGGGCTT  
TTACTATCTCCAGAATGTATTTTCTTTTCCGTAAGACTCAAAAGTAATATAAGGTCTACAAATCTA  
CTAAAAAGTCTCTGCAAAAAGTAGATGAAGAGGACTCTGATGAAGAAAGCCATCATGATGAGATGAGTGA  
GCAGGAAGAGGAGCTTGAGGATGATCCTACTGTAGTCAAAACTATAAGACCTGGAAAAAGCAGTTCAG  
TCTTTTCGGTATGATGTTGCTCTGAAGACGGGCTAGATATTGGGAGAAACAAAGTGAAGATGCTTTCT  
ACAAAGGTGAAGTCAAGCTGAATGAGGAAAAATTATGAAGAAAGCAGAACGGTGAAGTGGGAGATAC  
ATTGGATCTTCTCATTGGAGAGGATAAAGAAGCAGGAACAGAGACAGTTATGCGGATTCTCTTGAAGGAA  
GTGTTTGAAGAGAAGACTGAAAGTGAAGAAATACAGAGTGGTGTACGGCGGTGGAAGTTTAAAGTTGC  
CTAAGAAGAGAATGTCTAA

**ACGCGT**ACGCGGCCGCTCGAGCAGAACTCATCTCAGAAGAGGATCTGGCAGCAATGATATCCTGGATT  
ACAAGGATGACGACGATAAGGTTTAA



**Protein Sequence:**

>RC227081 protein sequence  
 Red=Cloning site Green=Tags(s)

MAMASVKLLAGVLRKPDWIGLWGVLRGTPSSYKLCISWNRYLYFSSTKLAPNYKTLFYNIFSLRLPGL  
 LLSPECIFPFSVRLKSNIRSTKSTKSLQKVDEEDSDEESHHEMSEQEELEDDPTVVKNYKDLKAVQ  
 SFRYDVVLKTGLDIGRNKVEDAFYKGLRLNEEKLVKKSRTVKVGDLDLLIGEDKEAGTETVMRILLKK  
 VFEKTESEKRYRVLRWWSLKLPPKRMKS

TRTRPLEQKLISEEDLAANDILDYKDDDDKV

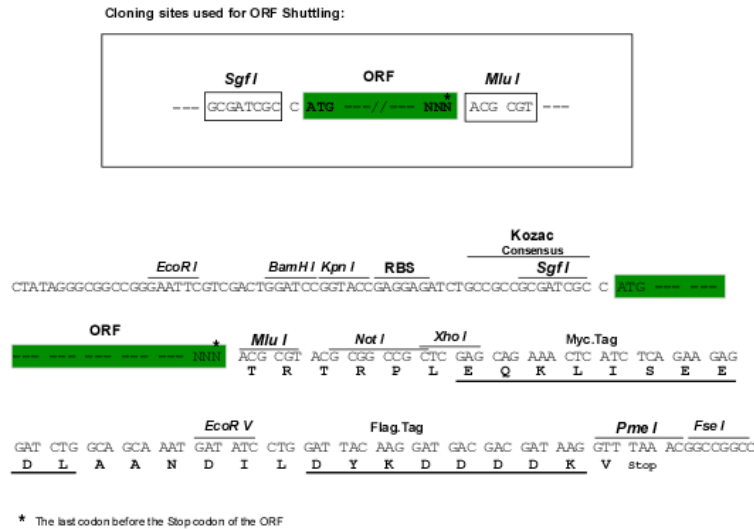
**Chromatograms:**

[https://cdn.origene.com/chromatograms/mk6434\\_d10.zip](https://cdn.origene.com/chromatograms/mk6434_d10.zip)

**Restriction Sites:**

SgfI-MluI

**Cloning Scheme:**



**ACCN:**

NM\_001142468

**ORF Size:**

720 bp

**OTI Disclaimer:**

The molecular sequence of this clone aligns with the gene accession number as a point of reference only. However, individual transcript sequences of the same gene can differ through naturally occurring variations (e.g. polymorphisms), each with its own valid existence. This clone is substantially in agreement with the reference, but a complete review of all prevailing variants is recommended prior to use. [More info](#)

**OTI Annotation:**

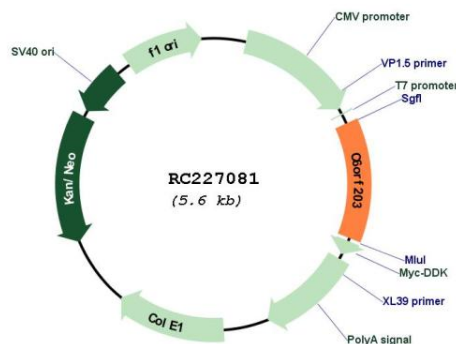
This clone was engineered to express the complete ORF with an expression tag. Expression varies depending on the nature of the gene.

**Components:**

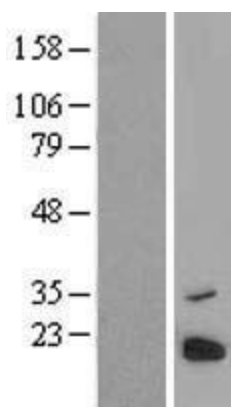
The ORF clone is ion-exchange column purified and shipped in a 2D barcoded Matrix tube containing 10ug of transfection-ready, dried plasmid DNA (reconstitute with 100 ul of water).

|                               |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |
|-------------------------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| <b>Reconstitution Method:</b> | <ol style="list-style-type: none"> <li>1. Centrifuge at 5,000xg for 5min.</li> <li>2. Carefully open the tube and add 100ul of sterile water to dissolve the DNA.</li> <li>3. Close the tube and incubate for 10 minutes at room temperature.</li> <li>4. Briefly vortex the tube and then do a quick spin (less than 5000xg) to concentrate the liquid at the bottom.</li> <li>5. Store the suspended plasmid at -20°C. The DNA is stable for at least one year from date of shipping when stored at -20°C.</li> </ol> |
| <b>Note:</b>                  | Plasmids are not sterile. For experiments where strict sterility is required, filtration with 0.22um filter is required.                                                                                                                                                                                                                                                                                                                                                                                                |
| <b>RefSeq:</b>                | <u>NM_001142468.3</u>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
| <b>RefSeq Size:</b>           | 1725 bp                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 |
| <b>RefSeq ORF:</b>            | 723 bp                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |
| <b>Locus ID:</b>              | 51250                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |
| <b>UniProt ID:</b>            | <u>Q9P0P8</u>                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           |
| <b>Cytogenetics:</b>          | 6q21                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
| <b>MW:</b>                    | 27.9 kDa                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                |
| <b>Gene Summary:</b>          | <p>Mitochondrial RNA-binding protein involved in mitochondrial transcription regulation. Functions as a protective factor to maintain proper mitochondrial RNA level during stress. Acts at the transcription level and its protective function depends on its RNA binding ability.</p> <p>[UniProtKB/Swiss-Prot Function]</p>                                                                                                                                                                                          |

**Product images:**



Circular map for RC227081



Western blot validation of overexpression lysate (Cat# [LY428114]) using anti-DDK antibody (Cat# [TA50011-100]). Left: Cell lysates from un-transfected HEK293T cells; Right: Cell lysates from HEK293T cells transfected with RC227081 using transfection reagent MegaTran 2.0 (Cat# [TT210002]).